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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/824,065	04/14/2004	A. Julie Kadashevich	303606.3001-100	6067
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LOTUS AND RATIONAL SOFTWARE McGuinness & Manaras LLP 125 NAGOG PARK ACTON, MA 01720			EXAMINER KAWSAR, ABDULLAH AL	
			ART UNIT 2195	PAPER NUMBER
			MAIL DATE 11/23/2007	DELIVERY MODE PAPER

**Please find below and/or attached an Office communication concerning this application or proceeding.**

The time period for reply, if any, is set in the attached communication.

## Office Action Summary

**Application No.**

10/824,065

**Applicant(s)**

KADASHEVICH, A. JULIE

**Examiner**

Abdullah-Al Kawsar

**Art Unit**

2195

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

### Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

### Status

- 1) ☒ Responsive to communication(s) filed on 03/09/2006.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

### Disposition of Claims

- 4) ☒ Claim(s) 1-23 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-23 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

### Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 04/14/2004 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.
- Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

### Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some \* c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
  2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

### Attachment(s)

- |  |   |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892)          | 4) <input type="checkbox"/> Interview Summary (PTO-413)           |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | Paper No(s)/Mail Date. _____                                      |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08)          | 5) <input type="checkbox"/> Notice of Informal Patent Application |
| Paper No(s)/Mail Date _____  | 6) <input type="checkbox"/> Other: _____                          |

**DETAILED ACTION**

1. Claims 1-23 are pending.

***Claim Rejections - 35 USC § 101***

2. 35 U.S.C. 101 reads as follows:

Whoever invents or discovers any new and useful process, machine, manufacture, or composition of matter, or any new and useful improvement thereof, may obtain a patent therefor, subject to the conditions and requirements of this title.

3. Claim 19 is rejected under 35 U.S.C. 101 because the claimed invention is directed to non-statutory subject matter. The claimed apparatus and systems are software per se, as they are not tangibly embodied on any sort of physical medium. The claim recite "means for identifying", "means for initiating", "means for determining", but these limitations are described as being software in the specification.

***Claim Rejections - 35 USC § 112***

4. The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention. .

5. Claims 1-23 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

- a. The following claim language is not clearly understood:

- i. Claim 1, line 1 it is unclear what is meant by "monitoring system processor usage time by a software agent" (i.e. using software agent to monitor

other process or monitoring CPU usage of software agents on the system?). Line 4 recite "initiating a lifetime timer" it is unclear how and when the lifetime timer is being initiated. Line 4 recite "monitoring an operating interval" it is unclear how the operating interval is being defined. Line 6 recite "determining said operating interval using the lifetime timer" it is unclear how it is determined using the lifetime timer. Claim 13, 16 and 20 has similar deficiency as claim 1 above.

ii. As per claims 12, it is unclear whether this is independent or dependent claim (i.e. claim 12 is a computer readable medium claim but dependent on claim 1.).

iii. Claim 13, line 6 recite "determining system processor resource allocation" it is unclear how it is determined (i.e. what is the basis of allocation? Priority or lifetime?). Line 7 recite "defining a footprint" it is not clear how the footprint is being defined and what is the footprint.

iv. Claim 20, line 10 recite "producing a like plurality of identified threads" it is unclear what is meant by that (i.e. creating "copy"). Line 13 it is unclear what is meant by "producing an identified thread set" (i.e. identify threads that belong to same agent?).

### ***Claim Rejections - 35 USC § 103***

6. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person

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having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

7. Claims 1-23 are rejected under 35 U.S.C. 103(a) being unpatentable over Ding et al(Ding) US Patent No. 6691067, in view of Freeman(Freeman) US Patent No. 6330588.
8. As per claims 1, Ding teaches the invention substantially as claimed including a method for monitoring system processor usage time by a software agent operating in a computer system, said method comprising the steps of (col 6, lines 20-27):
- identifying said agent by associating an agent identifier therewith(col 9, lines 24-26 );
  - initiating an agent lifetime timer for monitoring an operating interval for said agent(col 13, lines 31-39);
  - determining said operating interval using said lifetime timer (col 13, lines 21-25); and
  - storing said operating interval and said agent identifier in a computer-readable memory(col 9, lines 19-30).

Ding does not disclose specifically monitoring system processor usage time by a software agent operating in a computer system.

However, Freeman teaches that monitoring system processor usage time by a software agent operating in a computer system(col 2, lines 5-8).

It would have been obvious to a person of ordinary skill in art at the time of invention was made to incorporate the teaching of Freeman into the method of Ding for monitoring system processor usage by a software agent. The modification would have been obvious because one of the ordinary skills of the art would monitor the software agent to confirm their activity and fix issues that causing the agent to stall.

9. As per claim 2, Ding teaches the said computer-readable memory includes a hash table (col 9, lines 31-43).
10. As per claim 3, Ding teaches that determining said operating interval further comprises identifying a start time and a completion time for said agent (col 13, lines 21-24).
11. As per claim 4, Ding teaches that determining said operating interval further comprises computing an elapsed time as the difference between said starting time and said completion time for said agent (col 13, lines 63-67 through col 14, line1).
12. As per claim 5, Ding teaches that associating said operating interval and said agent identifier with other operating intervals and agent identifiers associated with a plurality of other software agents operating in said system (col 7, lines 21-24; col 13, lines 18-39).
13. As per claim 6, Ding teaches that filtering said agent and said plurality of other agents according to predefined filtering criteria to produce a filtered set (col 10, lines 64-67 through col 11, lines 1-6).
14. As per claim 7, Ding teaches the rank ordering said filtered set (col 10, lines 55-57).

15. As per claim 8, Ding teaches that making said filtered set available to a display device (col 7, lines 37-43; col 10, lines 64-67 through col 11, lines 1-6).
16. As per claim 9, Ding teaches that determining a corrective measure for at least one member of said filtered set (col 11, lines 1-10; lines 54-67 through col 12, lines 1-4).
17. As per claim 10, Ding teaches that displaying said corrective measure on a display device (col 11, lines 26-31; lines 54-67 through col 12, lines 1-4).
18. As per claim 11, Ding teaches that corrective measure is implemented by said system (col 21, lines 53-67).
19. As per claim 13, Ding teaches the invention substantially as claimed including a method for monitoring system processor time usage by a software agent having a thread associated therewith, said thread having a thread lifetime and said agent having an agent lifetime, said method comprising the steps of(col 6, lines 20-27):
- associating an agent identifier with said agent (col 9, lines 24-26);
  - initiating an agent lifetime timer for monitoring said agent lifetime (col 13, lines 31-39);
  - determining system processor resource allocations associated with said agent, said resource allocations defining a footprint for said agent comprising(col 13, lines 31-39):
    - an amount of system processor resources utilized by said thread during said thread lifetime (col 13, lines 31-39); and

an amount of system processor resources utilized by said agent during said agent lifetime  
(col 13, lines 31-39);

associating said footprint with said agent identifier (col 10, lines 33-46);

storing said footprint and said agent identifier in a computer-readable memory(col 9,  
lines 31-43);

comparing said footprint of said agent to a plurality of footprints associated with a like  
plurality of other software agents(col 10, lines 53-17;col 7, lines 21-24);

ranking said footprint of said agent against said plurality of footprints(col 10, lines 55-  
57); and

displaying those of said agent footprint and said plurality of footprints exceeding a  
predefined threshold (col 7, lines 37-49).

Ding does not disclose specifically monitoring system processor usage time by a software  
agent operating in a computer system.

However, Freeman teaches that monitoring system processor usage time by a software  
agent operating in a computer system(col 2, lines 5-8).

20. As per claim 14, Ding teaches that establishing a system processor resources  
configuration threshold defining a maximum amount of system processor resources to be utilized  
by each of said software agent and said plurality of other software agents (col 6, lines 20-27; col  
7, lines 39-49).



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21. As per claim 15, Ding teaches that running a collection probe to determine if a total amount of consumed system processor resources exceeds said configuration threshold( col 7, lines 39-42); and

performing said initiating step when said total amount of consumed system processor resources exceeds said configuration threshold (col 8, lines 1-26).

22. As per claim 16, Ding teaches the invention substantially as claimed including a computer program product having machine-readable instructions disposed thereon for instructing a processor to perform a method for monitoring system processor time for a software agent operating in a computer system, said computer program product comprising(col 6, lines 20-27):

instructions for initiating an agent lifetime timer for monitoring an operating interval associated with said agent(col 13 lines 31-39);

instructions for determining system processor resource allocations associated with said agent(col 13, lines 31-39);

instructions for storing said operating interval and said resource allocations associated with said agent(col 9, lines 19-30); and

instructions for notifying a system operator about said operating interval and said resource allocations( col 7, lines 43-48).

Ding does not disclose specifically monitoring system processor time for a software agent operating in a computer system.

However, Freeman teaches that monitoring system processor time for a software agent operating in a computer system (col 2, lines 5-8).

23. As per claim 17, Ding teaches that instructions for associating a software agent identifier with said agent, said identifier for facilitating tracking said system processor time associated with said agent(col 10, lines 33-46).

24. As per claim 18, Ding teaches that instructions for associating said software agent identifier with said operating interval and said resource allocations prior to storing said operating interval and said resource allocations associated with said agent (col 10, lines 33-46).

25. As per claim 20, Ding teaches the invention substantially as claimed including a method for tracking system processor time for a target agent operatively associated with a hypertext transport protocol process operating on a computer system and running a plurality of threads, said target agent further operating with at least one of said plurality of threads, said method comprising(col 6, lines 20-27; col 8, lines 17-26):

initiating an agent tracking function in machine-executable code in said computer system(col 9, lines 24-26);

creating a computer-readable hash table in a memory operatively associated with said computer system (col 9, lines 31-43);

identifying members of said plurality of threads by associating a thread identifier with each member of said plurality of threads producing a like plurality of identified threads(col 10, lines 39-42);

identifying those of said plurality of identified threads having said target agent operating therewith producing an identified thread set(col 10, lines 39-45);

determining an amount of said system processor time utilized by said identified thread set(col 13, lines 31-39); and

storing said system processor time for said identified thread set in said hash table, thereby tracking said system processor time for said target agent(col 9, lines 31-43).

Ding does not disclose specifically target agent operatively associated with a hypertext transport protocol process operating on a computer system.

However, Freeman teaches that target agent operatively associated with a hypertext transport protocol process operating on a computer system and (col 2, lines 5-8; col 5, lines 51-62).

26. As per claims 12, it is a computer readable medium claim of claim 1 above. Therefore, it is rejected under the same rations as of claim 1 above.

27. As per claim 19, it is a means plus function claim of combined method of claims 1 and 2 above. Therefore, it is rejected under the same rational as claims 1 and 2 above.

28. As per claims 21-23, they have similar limitations of claims 6-8 above. Therefore, they are rejected under the same rational as of claims 6-8 above.

*Conclusion*

29. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure.


Hafez et al.(US Patent No. 6560647), Borella et al.(US Patent No. 7218609).

30. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Abdullah-Al Kawsar whose telephone number is 571-270-3169. The examiner can normally be reached on 7:30am to 5:00pm, EST.

31. If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Meng Ai T. An can be reached on 571-272-3756. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

32. Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

Abdullah Al Kawsar  
Parent Examiner  
ART Unit 2195

  
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